

REMARKS/ARGUMENTS

Applicant acknowledges receipt of the Final Office Action dated October 14, 2009. By this Response, claims 1 and 13 are amended. Claims 1, 2, 7-11, 13, 14, and 17 are pending in this application. Claims 1, 2, 7-11, 13, and 14 are rejected under 35 U.S.C. §102(b) as being anticipated by *Mizushima*, U.S. Patent Application Publication No. 2002/0017642 ("*Mizushima*"). Claim 17 is rejected as unpatentable over *Mizushima* and Murthy, U.S. Patent No. 6,723,622 ("*Murthy*"). Applicant believes the pending claims are allowable over the art of record and respectfully requests reconsideration and allowance of all claims.

I. Claims 1, 2, 7-11, 13, and 14 are not anticipated by *Mizushima*.

The Examiner rejected claims 1, 2, 7-11, 13, and 14 as being anticipated by *Mizushima*. Applicant submits that claims 1, 2, 7-11, 13, and 14 are not anticipated by *Mizushima* because *Mizushima* fails to disclose each and every limitation of these claims.

Claim 1 is an independent claim upon which claims 2 and 7-11 depend. Claim 13 is an independent claim upon which claim 14 depends. In view of the Examiner's comments in the Final Office Action, Applicant has chosen to amend claims 1 and 13 to clarify the claimed subject matter. Specifically, claim 1 as amended recites "wherein the rate of decrease of the ratio is linear and different on opposite sides of an intermediate point, and wherein the ratio is decreasing on opposite sides of the intermediate point." In addition, claim 13 as amended recites "the rate of decrease of the ratio being linear and different on opposite sides of an intermediate point, and wherein the ratio is decreasing on opposite sides of the intermediate point." Nothing in *Mizushima* discloses such recitations.

In contrast to the present claims, *Mizushima* clearly shows that the ratio decreases about one side of an intermediate point, and remains constant on the opposing side of the intermediate point. (*Mizushima*, para. [0061]; FIG. 7.) For instance, in regards to reference q2, Figure 7 of *Mizushima* clearly shows that the ratio decreases on one side of an intermediate point while remaining constant on the other side of the point. (*Mizushima*, para. [0061]; Fig. 7.) This difference between *Mizushima* and the present claims was highlighted by the Examiner in the

Final Office Action, noting that q2 of Figure 7 has a “sloped section” and a “constant section” on opposite sides of a point. (Final Office Action, pg. 4, para. 14.) The constant section of q2 cannot possibly be considered a point as this section is clearly a significant portion of the thickness of the substrate. Rather, as shown by the Examiner, the intermediate point in Figure 7 of *Mizushima* is between the sloped section of q2 and the constant section of Q2. (*Mizushima*, Fig. 7.) Accordingly, *Mizushima* clearly discloses a ratio that is constant one side of an intermediate point and is not decreasing on opposite sides of the intermediate point as required by claims 1 and 13. (*Mizushima*, para. [0061], FIG. 7.) An advantage of the arrangement of the present claims is that the defectivity and surface roughness of the final compound material are improved improving the speed of the semiconductors.

In view of the recitations in independent claims 1 and 13 that are not disclosed by *Mizushima*, the Applicant respectfully requests that the Examiner withdraw the § 102(b) rejections and allow independent claims 1 and 13. Applicant further requests that the Examiner also withdraw the § 102(b) rejections of dependent claims 2, 7-11, and 14, since it is submitted that independent claims 1 and 13 are allowable. Dependent claims 2, 7-11, and 14 must *a fortiori* also be allowable, since they carry with them all the limitations of the independent claims 1 and 13 to which they ultimately refer.

III. Claim 17 is patentable over *Mizushima* and *Murthy*.

Applicant respectfully traverses the Examiner's rejection of claim 17 under §103 as being unpatentable over *Mizushima* and *Murthy*. Applicant submits that the Examiner has not made a *prima facie* case of obviousness in rejecting such claims.

Claim 13 is an independent claim upon which claim 17 depends. As noted above, nothing in *Mizushima* discloses all recitations of independent claim 13. Nothing in *Murthy* teaches or suggests the missing recitations of independent claim 13.

In view of the recitations in independent claim 13 that are neither taught nor suggested by *Mizushima* and *Murthy*, the Applicant respectfully submits that independent claim 13 is allowable over *Mizushima* and *Murthy*. Applicant therefore requests that the Examiner withdraw the §103 rejections of dependent claim 17, since it is submitted that independent claim 13 is allowable.

Dependent claim 17 must be allowable, since it carries all the limitations of the allowable independent claim 13 to which it refers.

IV. Conclusion

Applicant respectfully requests reconsideration, allowance of the pending claims and a timely Notice of Allowance be issued in this case. If the Examiner feels that a telephone conference would expedite the resolution of this case, the Examiner is respectfully requested to contact the undersigned.

In the course of the foregoing discussions, Applicant may have at times referred to claim limitations in shorthand fashion or may have focused on a particular claim element. This discussion should not be interpreted to mean that the other limitations can be ignored or dismissed. The claims must be viewed as a whole, and each limitation of the claims must be considered when determining the patentability of the claims. Moreover, it should be understood that there may be other distinctions between the claims and the prior art that have yet to be raised but which may be raised in the future.

Respectfully submitted,

/ctumey/
Corey S. Tumey
Tumey L.L.P.
Reg. No. 57,079
P. O. Box 22188
Houston, Texas 77227-2188
(713) 622-7005 (Phone)
(713) 622-0220 (Fax)
ATTORNEY FOR APPLICANT